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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/645,555	08/22/2003	Ali Sazegari	P2807-828	8696

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BUCHANAN, INGERSOLL & ROONEY PC
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EXAMINER

NGO, CHUONG D

ART UNIT	PAPER NUMBER
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2193

NOTIFICATION DATE	DELIVERY MODE
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12/17/2008

ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

ADIPFDD@bipc.com

Office Action Summary	Application No. 10/645,555	Applicant(s) SAZEGARI ET AL.	
	Examiner Chuong D. Ngo	Art Unit 2193	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 09 October 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,4-6,8,9,16,18,19,21-25 and 27 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,4-6,8,9,16,18,19,21-25 and 27 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. Claims 1,4-6,8,9,16,18,19,21-25 and 27 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

Claims 1,4-6,8,9,16,21-25 and 27 are directed to a computer related inventions that merely perform calculation and manipulation of data. In order for such a claimed invention that merely performs calculations and manipulations of data to be statutory, the claimed invention must accomplish a practical application, and is not directed to a preemption of a calculation and/or manipulation data. That is the claimed invention must transform an article or physical object to a different state or thing, or produce a useful, concrete and tangible result and not cover every substantial practical application. See State Street 47 USPQ2d, Benson 175 USPQ, and “Interim Guidelines for Examination of Patent Applications for Patent Subject Matter Eligibility”, OG Notices: 22 November 2005. It is clear from claims 1,4-6,8,9,16,21-25 and 27 that the claims merely involve calculations and manipulations of data in performing calculations. The inputs are numbers and the outputs are also numbers. The claimed inventions do not result in a physical transformation. Further, the result of the invention is merely numerical values without a practical application recited in the claims that makes the result useful, concrete and tangible. The mere recitation in the claims that the input and output are input and output value for a media signal does not necessarily constitute any practical application for the invention. The result produced by the claimed invention is clearly a mere value that approximates a mathematical function of an input value, it does not have a real world value and thus is not result useful, concrete and tangible. Therefore, the claimed invention is directed to non-statutory

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subject matter as the claims fail to accomplish a practical application. Further, since the claims do not limit the invention a practical application, they appear to cover every substantial practical application, and thus is also directed to a preemption of the claimed manipulation and calculation of data in any and every practical application.

Claims 18 and 19 is also directed to non-statutory subject matter because the claims recite a mental process. It should be noted that for a method to be statutory, the method must (1) be tied to another statutory class (such as a particular apparatus) or (2) transform underlying subject matter (such as an article or materials) to a different state or thing (In re Bilski). It is clear from claims 18 and 19 that the method do not transform a subject matter to a different state or thing, and the method steps are not implemented by a particular apparatus or tied to another statutory class. Therefore, claims 18 and 19 are directed to a non statutory subject matter for reciting merely mental steps.

2. Claims 18 and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Betrisey et al. (6,360 ,023) in view of Hurley (5,235,410).

Betrisey et al. disclose in figure 3 a method for processing an image for display in a computer system including receiving an input display value for a pixel of the image in a first color space (foreground color, background color), generating a corrected display value in a second color space corresponding to the gamma of a display device in accordance with said input display value (311,313); processing said corrected display value by combining the corrected display value with another display value in said second color space to generate a blended display value for said pixel in said second color space to produce a processed display value for said pixel

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(312); and converting said processed display value to said first color space said processed display value by an inverse function of the generating a corrected display value in a second color space (314). It is noted that Betrisey et al. does not disclose the generating a corrected display value by a second-order polynomial that approximates a power function corresponding to the gamma of a display device, and the converting the processed display value to said first color space by evaluating a polynomial that is the inverse of said second-order polynomial. However, Hurley discloses a generation of a corrected display value by a second-order polynomial that approximates a power function corresponding to the gamma correction (see figure 6). It would have been obvious to a person of ordinary skill in the art to approximate a power function corresponding to the gamma correction and its inverse in Betrisey et al. by a second-order polynomial and the inverse of the second-order polynomial, respectively, as suggested by Hurley, in order to perform the gamma correction and its inverse in a simple and effective manner (see Hurley, col. 3, lines 1-3). The approximation would obviously yield an error that is below some prescribed threshold value as claimed.

3. Applicant's arguments filed 10/09/2008 have been fully considered but they are not persuasive.

Regarding the rejection under 35 USC 101, it is respectfully submitted that the mere recitations in the claims that the input and output are input and output values for a media signal, not necessarily constitute or warrant a practical application that produce a useful, concrete and tangible result for the invention. There is no clear practical application recited in the claims. In deed, the result produced by the invention as recited in the claim is still a mere value that

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approximates a mathematical function of an input value. It does not have any real world value and thus is not useful, concrete and tangible. Further, the claimed feature that "said polynomials and intervals are determined such that the maximum error between said output values and said function is approximately equal for each of said intervals" is merely to define the functional relation between the polynomials and the intervals. It does not transform an article or physical object to a different state or thing, or produce a useful, concrete and tangible result, and thus fails to render the claimed invention statutory.

Regarding to the rejection of claims 18 and 19 under 35 USC 103, applicant's argument are not persuasive because once applying the teaching of Hurley to approximating a power function corresponding to the gamma correction in Betrisey et al. by a second-order polynomial in order to perform the gamma correction in a simple and effective manner, the inverse function for converting the processed display value to the first color space would be the inverse of the second-order polynomial. Therefore, it would have been also obvious to a person of ordinary skill in the art to use a polynomial that is the inverse of the second polynomial for converting the processed display value to the first color space as claimed.

4. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Chuong D. Ngo whose telephone number is (571) 272-3731. The examiner can normally be reached on Monday-Friday.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Lewis, Jr. A. Bullock can be reached on (571) 272-3759. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

12/12/2008

/Chuong D Ngo/
Primary Examiner, Art Unit 2193